

Appliances

Washing machines

Updated 24 Jan 2014



Introduction

Which washing machine is best? Our independent lab tests and reviews give you the information you need to shop smart.

We've tested the dirt removal, gentleness and efficiency of a wide range of top- and front-loading washing machines.

Use our interactive test results databases to find the model and price that's right for you, or jump straight in to our [best buy recommendations](#).

Models we tested

This report contains test results and [recommendations](#) for the following washing machines. They're presented in two groups as we've [changed the way we test](#).

Latest test - tested with 3.5kg load

[AEG L77480FL](#)

[Asko W6444 1400 RPM](#)

[Asko W6884 Eco 1800 RPM](#)

[Aspira TWLWP50](#)

[Aspira TWLWP60](#)

[Beko WMB71231LA](#)

[Bosch WAP24160AU Avantixx](#)

[Bosch WAP24261AU Avantixx](#)

[Bosch WAS28461AU Avantixx](#)

[Electrolux EWF12832](#)

[Electrolux EWF14742](#)

[Electrolux EWF14912](#)

[Fisher & Paykel MW513 QuickSmart](#)

[Fisher & Paykel WA70T60FW1 FabricSmart](#)

[Fisher & Paykel WA70T60GW1 WashSmart](#)

[Fisher & Paykel WA80T65FW1 FabricSmart](#)

[Fisher & Paykel WA80T65GW1 WashSmart](#)

[Fisher & Paykel WH7560J1 Quicksmart](#)

[Fisher & Paykel WH8560J1 Quicksmart](#)

[Fisher & Paykel WL1068P1 Cleansmart](#)

[Fisher & Paykel WL80T65CW2 AquaSmart 2](#)

[Haier HWM70-1203D](#)

[Haier HWMP55-918 Fuzzy Logic](#)

[Haier HWMP65-918](#)

[LG WD12021D6](#)

[LG WD14024D6](#)

[LG WD14070SD6 Inverter Direct Drive 6 Motion
TrueSteam](#)

[LG WD14130D6 Inverter Direct Drive 6 Motion](#)

[LG WT-H550 Inverter DirectDrive](#)

[LG WT-H650](#)

[LG WT-H750 6 Motion](#)

[LG WT-R10856](#)

[Miele W1913 Honeycomb Care](#)

[Miele W5741 Honeycomb Care](#)

[Miele W5873 WPS](#)

[Miele W5903 Honeycomb Care](#)

[Panasonic NA-140VG3 Econavi](#)

[Panasonic NA-148VG3 Econavi](#)

[Samsung WA455DRHDWR](#)

[Samsung WA65F5S](#)

[Samsung WA70F5G](#)

[Samsung WA75F5S](#)

[Samsung WA80F5G](#)

[Samsung WF1752WPW](#)

[Samsung WF1804WPC Ecobubble](#)

[Samsung WF756UMSAWQ Bubblewash](#)

[Simpson SWT554 EZI Set](#)

[Simpson SWT604 EZI Set](#)

[Simpson SWT704 EZI Set](#)

[Simpson SWT801 EZI Sensor](#)

[Simpson SWT954 EZI Set](#)

Earlier test - tested at full capacity

[Fisher & Paykel WA55T56GW1](#)

[Haier HWMP95TL](#)

[LG Turbodrum DD WT-R107](#)

[LG WD11020D](#)

[LG WD13020D](#)

[Simpson SWF85561](#)

[Simpson SWT 554](#)

[Simpson SWT704](#)

Note: We regularly test washing machines and add them to our database of tested models. We don't delete discontinued models immediately as some may still be available in stores or second hand.

Checklist



If you're thinking about buying a washing machine, there are 3 main features you need to consider – **loading style**, **size**, and **price**.

Top or front loader?

Top loaders and front loaders wash equally well – they just do it differently. Front loaders remove dirt by gently turning the clothes over and over. Top loaders usually get clothes clean by vigorously swirling them back and forth in the water.

Top loaders are faster – and you can add extra items after the wash starts (you can do this with some front loaders, too). But top loaders can be tougher on your clothes. Front loaders use less water, which means they'll also use less energy on a warm or a hot wash. They're gentler on clothes and almost always rate highly for this in our tests. But they take a lot longer to get through their cycles.

If you have lots of delicate items in your wardrobe, a gentle front-loading machine with a cycle for hand-washable items will help your clothes last longer. But if you just need a machine to get the dirt out of non-delicate clothes and fabrics, any of the top loaders in our test will do a good job.

Impellers or agitators?

Top-loaders have two options for swirling the load: an agitator (central spindle), or an impeller (a small bump at the bottom of the bowl). Impellers spin and pulse to turn the washing over, rather than twisting it. Washing machines with impellers tend to be easier to load and unload, but their dirt removal isn't always as good as agitator models.

Machine size

Most people buy around the 5.5kg mark, but if you have a mid-size to larger family we suggest you look at a larger model. Many 7kg models will fit in the standard 600mm wide space in a laundry. A larger-capacity machine with auto-water-level sensing is as good a choice as a smaller-capacity model as it will adjust water levels to match the load.

Some washing machines are not as big as they claim. If you buy a washer and it doesn't wash a full load properly, or the clothes get clogged on the agitator, or it regularly goes out of balance during spin cycles, you should complain to the retailer.

The [Consumer Guarantees Act](#) says a product must be fit for its purpose. If your "8kg" machine washes only 6kg of clothes, you have the right to get it fixed or replaced, or to get your money back.



How much in a full load?

A full load for a 5kg washing machine equates to: 4 towels, 2 double sheets, 4 shirts, 3 T-shirts, 5 hankies, 2 facecloths, 3 pairs underpants, and 4 pillowcases.

In an 8kg load (as pictured right) for a large machine, the extra 3kg equates to: 4 shirts, 6 T-shirts, and 4 towels. See [Our new test](#) for more about the load sizes we use for our testing.

Price

Most washing machines wash clothes well. But there can be big differences in the additional features they offer, and these affect the price. When you're looking at the price tags, remember: higher price does not always equal better performance.

If you're buying a top loader, the extra money should buy you a machine that will adjust the wash to match the load size and maybe even the fabric. This can mean lower energy costs, lower water use and even lower fabric wear, with the convenience of not having to worry about the cycle you choose.

With front-loading models, paying more generally means more features like spin speeds, electronic controls and the like.

Other considerations

Cycle time

Top loaders are generally much faster than front loaders on the normal cycle. But, all machines have a range of cycle times to choose from. Most front loaders have fast wash cycles that come close to matching the time taken by top loaders on the normal cycle.

Spin efficiency

Machines with a spin speed of 1000rpm will remove a good amount of water, cutting down on drying time. But faster spin speeds can mean more creasing (and possibly more ironing). Look for a model that allows you to select the spin speed independently from the wash cycle.

Cold washes

Cold washes are definitely good for the environment, and most laundry detergents are formulated to work in 15 to 20°C cold water. But some front-loading models can't do a genuine cold wash. Several models in our test could only do a 30°C wash when set on a "normal" or "cottons" wash cycle. That's very close to the "warm" setting on many machines.

If you live in a really cold climate, some machines will do a "controlled cold" wash where a small amount of hot water is used to lift the wash temperature to around 20°C. This helps the detergent dissolve properly.

Tip: *Warmer water makes most detergents more effective - so for those really dirty loads, a warm wash should give you cleaner clothes.*

See [Water conservation](#) for more information about water use and cold water washing.

Out of balance

Many models now have an out-of-balance correction function. If the load gets too unevenly distributed during the wash, the machine will stop, tumble or agitate gently to re-arrange the load, and start again. It's really valuable if you put on a load overnight and want to throw it on the line before you go to work.

Vibrating floorboards

Concrete floors cope best with the extra weight and vibrations of a front loader, but most manufacturers say that standing a front loader on a timber floor shouldn't cause damage to the floor ... provided the floor is in good condition, is level, and can hold the machine's weight ... and provided the machine's feet are adjusted properly and stabilise automatically. To prevent scratches on polished timber flooring, you might want to put a non-slip mat under the machine.

If the floorboards are in poorer condition, some manufacturers advise putting a panel under the machine to distribute its weight evenly. Miele goes further: it recommends screwing the panel through the floorboards into as many floor joists as possible, to help minimise vibration. It also suggests putting the machine in a corner where

the floor is most stable.

Woollens wash cycles

Almost all washing machines have a wash cycle that is suitable for washing woollen items labelled as *machine washable*. It may be called a "wool" cycle or you may have to adapt another wash cycle such as "delicates" by shortening the wash time, lowering the spin speed and/or setting the water temperature to warm.

Some front loaders have an extra-gentle cycle for items labelled *handwash only* – including woollens. It may be called "handwash" or "handwash/woollens". You won't find this feature in top-loading machines – they're typically not gentle enough.

If a model has this feature, we give it a tick for "woollens cycle – hand-washable" in the full specifications section of the [Test results](#).

Buying second hand

Washing machines often get heavy use - so if you're buying second hand, newer is better.

Only buy if the machine looks tidy and well cared for. Fisher & Paykel is the most common second-hand brand - but they can be expensive to repair.

Stick to well-known reliable brands. And buy a machine that's less than 5 years old; it'll be easier to get parts if anything needs fixing. See our [reliability data](#) for what brands to look for.

Looking at a front loader? Check the door seal is intact and the door shuts properly.

Check that all connecting and drainage hoses are intact and in good condition.

Under the Electricity Act, all electrical appliances for sale must be safe - whether they're new or second-hand, bought privately or from a dealer.

If you buy from a second-hand dealer and then discover the machine's faulty, you're covered by the [Consumer Guarantees Act](#). If you buy privately, you're not.

Our new test



We've changed how we test to make it more like the way you wash.

We used to test washing machines on a "full load". So if a machine had a maximum capacity of 7kg, that's how much we stuffed into it. As our past tests found, this wasn't always easy to do – and we also know this isn't what people do at home.

We now test washing machines using a smaller (3.5kg) load. Our research shows this is about in the middle of the range of amounts that most people wash, whatever the size of their machine.

What's changed

We retested several machines from previous tests with our “new” 3.5kg load. We found:

- increased **water savings** in machines (particularly front loaders) that have an auto-sensing water level feature
- changes in **dirt-removal performance** (better for front loaders; worse for top loaders)
- better **rinse performance** in both front and top loaders
- improved **gentleness** in top loaders (though not enough to make them as gentle as front loaders)
- shorter **cycle times** (and lower **running costs**) for many machines.

We've also revised our rating scale so that dirt removal is the most important part of the scoring. Dirt removal now accounts for 50 percent of the overall score (up from 40 percent). Rinsing accounts for 20 percent; and gentleness, water efficiency and spin efficiency are each worth 10 percent.

For full details see our [latest \(3.5kg load\) test results](#) and also machines from our [earlier \(full load\) tests](#) that are still available.

Disappointing scores

We were surprised to find some top loaders – including those that sense the load size and adjust their water level accordingly – made very little adjustment to their water use when washing a 3.5kg load.

We asked Fisher & Paykel why its WA70T60FW1 FabricSmart top loader used 166 litres of water to wash a 3.5kg load – 11 litres more than when we tested it at full (7kg) capacity.

F&P responded that the FabricSmart machine responds to the types of fabrics in the load. We use an Australian/New Zealand Standard test load made up of sheets, pillowcases and heavy cotton towels: the machine senses these heavy-duty fabrics and adds water accordingly. Fisher & Paykel says its machine would use less water when washing a mixed load of clothes and towels.

Our recommendations

We [recommend](#) front loaders that score at least 80 percent overall and 8.0 or better for dirt removal. If you prefer top loaders, we recommend those that score at least 65 percent overall and 7.0 or better for dirt removal.

We don't recommend brands that rate "below average" in our [reliability survey](#). That's why some well-performing models are "worth considering" rather than recommended.

We recommend

Note: we've [changed the way we test](#). Our recommendations include models from our latest test (tested with a 3.5kg load) and earlier tests (tested at full capacity).

We recommend front loaders that score at least 80 percent overall and 8.0 or better for dirt removal. If you prefer top loaders, we recommend those that score at least 65 percent overall and 7.0 or better for dirt removal.

 Consumer Recommends

Small models (up to 5.5kg)

[User Reviews 0](#)

✓ **Aspira TWLWP50 Tested with 3.5kg load**

\$599

Good points

Good dirt removal. Very good rinsing. Good water efficiency.

But

Poor gentleness. Only OK spin efficiency. Long cycle-time for a top loader (on "normal" cycle). No selectable spin-speed.

Brand reliability

We have no reliability information for this brand

[User Reviews 6](#)

✓ **Haier HWMP55-918 Fuzzy Logic Tested with 3.5kg load**

\$499

Good points

Good dirt removal. Very good rinsing. Good water efficiency.

But

Poor gentleness. Only OK spin efficiency. Long cycle-time for a top loader (on "normal" cycle). No selectable spin-speed.

Brand reliability

This brand was 77% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 1](#)

★LG WT-H550 Inverter DirectDrive Tested with 3.5kg load

\$899

Good points

Good dirt removal. Excellent rinsing. Good gentleness.

But

Poor water efficiency. Only OK spin efficiency. No hand-washable woollens cycle.

Brand reliability

This brand was 92% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

★Simpson SWT554 EZI Set Tested with 3.5kg load

\$650

Good points

Good dirt removal. Very good rinsing. Good water efficiency.

But

Only just OK gentleness and spin efficiency. No delay timer. No auto-sensing water level. No selectable spin-speed.

Brand reliability

This brand was 80% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 2](#)

★**Fisher & Paykel MW513 QuickSmart Tested with 3.5kg load**

\$699

Good points

Good dirt removal. Excellent rinsing. Good spin efficiency.

But

Only OK gentleness. Very poor water efficiency. No time-remaining display. No delay timer. No auto-sensing water level.

Brand reliability

This brand was 88% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

Medium-size models (6kg to 7kg)

[User Reviews 4](#)

✓**Bosch WAP24160AU Avantixx Tested with 3.5kg load**

\$1,679

Good points

Very good dirt removal. Excellent rinsing. Good gentleness. Good water efficiency. Good spin efficiency. Hand-washable woollens cycle.

But

(No obvious bad points.)

Brand reliability

This brand was 91% reliable in our 2013 appliance-reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

✓ **LG WD12021D6 Tested with 3.5kg load**

\$1,299

Good points

Very good dirt removal. Excellent rinsing. Good gentleness. Good water efficiency. Good spin efficiency.

But

No hand-washable woollens cycle.

Brand reliability

This brand was 92% reliable in our 2013 appliance-reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

✓ **Asko W6884 Eco 1800 RPM Tested with 3.5kg load**

\$2,699

Good points

Very good dirt removal. Excellent rinsing. Good gentleness and water efficiency. Very good spin efficiency. Hot- and cold-tap connections. Hand-washable woollens cycle.

But

Relatively long cycle-time (on "auto" cycle).

Brand reliability

This brand was 78% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

✓ **Aspira TWLWP60 Tested with 3.5kg load**

\$699

Good points

Good dirt removal, rinsing and water efficiency.

But

Only OK gentleness and spin efficiency. No selectable spin-speed.

Brand reliability

We have no reliability information for this brand

[User Reviews 2](#)

✓ **Haier HWMP65-918 Tested with 3.5kg load**

\$630

Good points

Good dirt removal, rinsing and water efficiency.

But

Only OK gentleness and spin efficiency. No selectable spin-speed.

Brand reliability

This brand was 77% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 1](#)

★ **Electrolux EWF14742 Tested with 3.5kg load**

\$1,098**Good points**

Good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Good spin efficiency. Hand-washable woollens cycle.

But

Cold-tap connection only. No lint filter.

Brand reliability

This brand was 81% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 5](#)**★Asko W6444 1400 RPM Tested with 3.5kg load****\$1,849****Good points**

Good dirt removal. Excellent rinsing. Good gentleness, water efficiency and spin efficiency. Hand-washable woollens cycle.

But

Relatively noisy.

Brand reliability

This brand was 78% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 2](#)**★Miele W1913 Honeycomb Care Tested with 3.5kg load****\$1,899****Good points**

Good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Good spin efficiency. Hand-washable woollens cycle.

But

No delay timer.

Brand reliability

This brand was 95% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 6](#)

★Samsung WF1752WPW Tested with 3.5kg load

\$999

Good points

Good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Good spin efficiency.

But

(No obvious bad points.)

Brand reliability

This brand was 81% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

★Beko WMB71231LA Tested with 3.5kg load

\$899

Good points

Good dirt removal. Excellent rinsing. Good gentleness. Good water efficiency. Good spin efficiency. Hand-washable woollens cycle.

But

(No obvious bad points.)

Brand reliability

We have no reliability information for this brand.

[User Reviews 0](#)

★Simpson SWT604 EZI Set Tested with 3.5kg load

\$1,050

Good points

Good dirt removal. Very good rinsing. Good water efficiency.

But

Only OK gentleness and spin efficiency. No delay timer. No auto-sensing water level. No selectable spin-speed.

Brand reliability

This brand was 80% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 1](#)

★Fisher & Paykel WA70T60GW1 WashSmart Tested with 3.5kg load

\$1,000

Good points

Good dirt removal. Excellent rinsing. Good spin efficiency. Has "favourite" cycle.

But

Only OK gentleness. Very poor water efficiency. No time-remaining display.

Brand reliability

This brand was 88% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

Large models (over 7.5kg)

[User Reviews 3](#)

✓ **Samsung WF756UMSAWQ Bubblewash Tested with 3.5kg load**

\$1,199

Good points

Very good dirt removal. Excellent rinsing. Good gentleness. Very good water efficiency. Good spin efficiency. Hand-washable woollens cycle.

But

(No obvious bad points.)

Brand reliability

This brand was 81% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

✓ **LG WD14024D6 Tested with 3.5kg load**

\$1,599

Good points

Very good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Very good spin efficiency.

But

No hand-washable woollens cycle.

Brand reliability

This brand was 92% reliable in our 2013 appliance-reliability survey (the average for washing machines was 87%).

[User Reviews 1](#)

✓ **Samsung WF1804WPC Ecobubble Tested with 3.5kg load**

\$999

Good points

Very good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Good spin efficiency. Hand-washable woollens cycle.

But

(No obvious bad points.)

Brand reliability

This brand was 81% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

✓ **LG WD14130D6 Inverter Direct Drive 6 Motion Tested with 3.5kg load**

\$1,600

Good points

Very good dirt removal and rinsing. Good gentleness. Very good water and spin efficiency.

But

No hand-washable woollens cycle.

Brand reliability

This brand was 92% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

✓ **Miele W5873 WPS Tested with 3.5kg load**

\$2,899

Good points

Good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Good spin efficiency. Hand-washable woollens cycle.

But

(No obvious bad points.)

Brand reliability

This brand was 95% reliable in our 2013 appliance-reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

✓ **LG WT-R10856 Tested with 3.5kg load**

\$1,999

Good points

Very good dirt removal. Excellent rinsing. Good spin efficiency.

But

Only OK gentleness. Only OK water efficiency. No hand-washable woollens cycle.

Brand reliability

This brand was 92% reliable in our 2013 appliance-reliability survey (the average for washing machines was 87%).

[User Reviews 1](#)

✓ **Fisher & Paykel WL1068P1 Cleansmart Tested with 3.5kg load**

\$1,999

Good points

Good dirt removal. Excellent rinsing. Good gentleness. Good spin efficiency.

But

Only OK water efficiency. No hand-washable woollens cycle.

Brand reliability

This brand was 88% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

★ **Electrolux EWF12832 Tested with 3.5kg load**

\$1,400

Good points

Good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Good spin efficiency.

But

No hand-washable woollens cycle.

Brand reliability

This brand was 81% reliable in our 2013 appliance-reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

★**Fisher & Paykel WH7560J1 Quicksmart Tested with 3.5kg load**

\$1,249

Good points

Good dirt removal. Excellent rinsing. Good gentleness. Very good water efficiency. Good spin efficiency.

But

No hand-washable or machine-washable woollens cycle.

Brand reliability

This brand was 88% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

★**Fisher & Paykel WH8560J1 Quicksmart Tested with 3.5kg load**

\$1,499

Good points

Good dirt removal. Excellent rinsing. OK gentleness. Good water and spin efficiency.

But

No hand-washable or machine-washable woollens cycle.

Brand reliability

This brand was 88% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

★**LG WD14070SD6 Inverter Direct Drive 6 Motion TrueSteam Tested with 3.5kg load**

\$2,700

Good points

Good dirt removal. Excellent rinsing. OK gentleness. Good water and spin efficiency.

But

No hand-washable woollens cycle.

Brand reliability

This brand was 92% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 5](#)

★**Miele W5741 Honeycomb Care Tested with 3.5kg load**

\$2,299

Good points

Good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Good spin efficiency. Hand-washable woollens cycle.

But

No delay timer.

Brand reliability

This brand was 95% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

★Miele W5903 Honeycomb Care Tested with 3.5kg load

\$2,599

Good points

Very good dirt removal and rinsing. Good gentleness. Excellent water efficiency. Good spin efficiency. Hot- and cold-tap connections. Hand-washable woollens cycle.

But

Can't do a true cold wash on the cottons cycle.

Brand reliability

This brand was 95% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 12](#)

★Panasonic NA-148VG3 Econavi Tested with 3.5kg load

\$1,599

Good points

Very good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Good spin efficiency. Hand-washable woollens cycle.

But

(No obvious bad points.)

Brand reliability

This brand was 82% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

★Electrolux EWF14912 Tested with 3.5kg load

\$2,000

Good points

Good dirt removal. Very good rinsing. Good gentleness. Very good water efficiency. Good spin efficiency.

But

No hand-washable woollens cycle.

Brand reliability

This brand was 81% reliable in our 2013 appliance-reliability survey (the average for washing machines was 87%).

[User Reviews 1](#)

★Simpson SWT801 EZI Sensor Tested with 3.5kg load

\$1,250

Good points

Good dirt removal. Excellent rinsing. Good spin efficiency. Has "favourite" cycle. Soft-closing lid.

But

Poor gentleness. Only OK water efficiency. Long cycle-time for a top loader (on "regular" cycle).

Brand reliability

This brand was 80% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 0](#)

★**Fisher & Paykel WA80T65FW1 FabricSmart Tested with 3.5kg load**

\$1,799

Good points

Good dirt removal. Excellent rinsing. Good gentleness. Good spin efficiency.

But

Very poor water efficiency. No hand-washable woollens cycle.

Brand reliability

This brand was 88% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

[User Reviews 3](#)

★**Fisher & Paykel WL80T65CW2 AquaSmart 2 Tested with 3.5kg load**

\$1,899

Good points

Good dirt removal. Excellent rinsing. Good spin efficiency. Lots of wash cycles.

But

Only OK gentleness and water efficiency. No fast wash.

Brand reliability

This brand was 88% reliable in our 2013 appliance reliability survey (the average for washing machines was 87%).

Also worth considering

These models from our earlier test are also still "worth considering". They were tested at full capacity (see [Our new test](#) for more information).

Large top loader

[LG Turbodrums DD WT-R107](#)

Small front loader

[Simpson SWF85561](#)

Reliability

Our 2013 [appliance reliability survey](#) showed overall, 87% of washing machines up to 5 years old hadn't needed repair.

Brand	Reliability	Margin of error
Miele (172)	95%	3%
LG (246)	92%	3%
Bosch (713)	91%	2%
Fisher & Paykel (2124)	88%	1%
Panasonic (97)	82%	8%
Samsung (334)	81%	4%
Electrolux (167)	81%	6%
Simpson (196)	80%	6%
Asko (92)	78%	8%
Haier (59)	77%	11%
Average (4429)	87%	



Bosch, LG and Miele were the most reliable brands: Miele achieved an outstanding 95 percent for reliability; Bosch and LG achieved 91 and 92 percent.

3 percent of those who took part in our survey said they'd had problems with the electronic circuits in their machine. This was a particular issue for Electrolux owners – 12 percent reported a circuit failure.

We compared the reliability of front loaders and top loaders: there was no difference.

Source

Consumer NZ Member Survey 2013. Members told us about washing machines bought new since 1 January 2008. Note this information applies to brands, not individual models, and not all brands show up in the survey.

Older appliances are more likely to have had problems than newer ones, so we have taken their age into account in our analysis. We analyse only those brands for which we receive more than 50 responses (the number of responses for each brand is shown in brackets).

Wash problems



Here's our advice for dealing with common washing problems.

Lint and other white deposits

Lint often collects on the washing, especially in top loaders. Top loaders that use less water can also cause deposits of detergent, which look a lot like lint. If you have these problems:

Sort the clothes, and where possible wash lint givers separately from lint collectors. Lint givers are mainly towels, chenille and nappies. Lint collectors are mainly synthetics, corduroy, poly-cotton and socks. Turn lint collectors inside out.

Wash smaller loads of same colour items, selecting full rinses (not spray rinses) to help remove lint and deposits in folds. On some machines you'll have to choose a **cycle** that has a full rinse.

Make sure you use enough detergent – it helps carry the lint away. But don't overdose: excess suds could stop the machine or make white deposits worse.

If feasible, don't use water-saving programmes for your wash. Low water-use is often related to deposit problems.

Use liquid detergent or pre-dissolve powders to ensure detergent particles don't deposit on to the clothes.

Fisher & Paykel Smart Drive owners: If you want to see the lint that comes out of the wash, F&P offer a filter option. Call the F&P Customer Call Centre on 0800 372 273, and ask them to send you a filter.

Greasy deposits

It's called scrud, and it's formed by a reaction between fabric softener and detergent residues. Scrud is waxy and greasy, and clings to unseen parts of the machine like under the agitator. Blobs can break free and deposit onto clothes.

Avoid using fabric softener, or use it sparingly and choose one with a thinner consistency.

When you use a softener, wash in warm water. If you regularly use fabric softener in cold washes, run a hot wash every fifth wash.

Clean your machine regularly using a hot wash and detergent. Check the manual for details.

Clean the filter (if your machine has one) and the detergent dispenser regularly.

Leave the door/lid open between washes to let the drum dry out.

Front loader door seals and mould

When mould grows on the seals or in the drum, you can get bad smells. These can make your clothing smell too.

To avoid mould problems:

Remove water from the seal after each wash.

Between washes, leave the door and detergent dispenser open – that lets the interior dry.

Wipe the rubber seal with hot water and detergent to get rid of the mould.

Try skipping fabric softener – it's not usually needed.

Once a month run a hot wash with a full-strength powder detergent.

Pump problems

Lint, scud or small objects can all block the pump inlet or the object trap.

On top loaders, remove the agitator and clean the pump inlet.

On front loaders, empty the object trap if it's accessible.

Check pockets before loading the machine. Matches, hairclips, paperclips and loose bra wires can all jam the pumps – and that requires a service call.

Fisher & Paykel suggests you use a lingerie bag to wash bras.

Scratchy towels

One of the downsides of front loaders (and water-efficient top loaders) is that they can produce stiff, rough or scratchy towels. That's because the towels are generally tumbling through just a little water rather than floating through lots like in an older-style top loader. And to get the fibres nicely fluffed up, towels need to be immersed in water.

Another reason could be that your front loader is in fact too water-efficient, using too little water for the rinse and leaving detergent residues in the wash. Our [Test results](#) can help you choose a machine that's good at rinsing while still being water-efficient.

Short of drying your towels for hours in an energy-guzzling clothes dryer to get them soft, you can try the following to help reduce the 'scratchy, flat' effect:

Adding an extra rinse to your towels wash.

Using a gentler wash cycle that uses more water.

Lowering the spin speed – higher spin speeds tend to flatten the fibres and line drying doesn't fluff them back up, making them feel hard.

Vigorously shaking out your towels, or putting them in the dryer on a 'cool' setting for 10 minutes, before hanging on the line. The tumbling action of the dryer will fluff the fibres back up and minimal energy is used as the heating element is not switched on.

Taking towels off the line when still a little damp and drying them off in the dryer.

As a last resort, you could try using a good quality fabric conditioner in the final rinse.

Fisher & Paykel AquaSmart



We tested the Fisher & Paykel Aquasmart back in 2007 and found it performed well. We thought it was "worth considering" as it combined good water efficiency and good rinsing performance with all the usual benefits of a top loader.

Following testing we received complaints that these machines can leave clean washing marked with white residue. So we re-tested the AquaSmart ... and we found that the type of washing detergent makes a difference. We achieved residue-free washing using Persil's Small and Mighty liquid concentrate. Turning off the high-efficiency mode to increase the amount of water used also helped.

We've now tested the new [Fisher & Paykel WL80T65CW2 Aquasmart 2](#) and carried out extra testing to see whether it left white detergent residue on dark clothing. Our testing found it didn't, but this is most likely due to its increased water usage, so it's not as water-efficient as its predecessor.

Water conservation



Waterless washing's still science fiction – unfortunately! But washing machines are getting better at extracting dirt with less water. Some machines are also designed to rinse well despite using less water.

There's official recognition that water supplies are increasingly stretched: mandatory water-efficiency labelling (WELS) came into effect in April 2011 for new washing machines and dishwashers.

If you need to conserve water, you can see which machines are best from the WELS labels. Or you could just check out [our ratings](#).

We've been rating water efficiency for many years, and we don't use special water-saving programmes when we test. We just use the normal wash (on high-efficiency machines this will be a water-saving programme). But because we use a "normal" wash our water-consumption figures will often be higher than those from WELS.

Water efficiency vs rinsing

Water efficiency means that many manufacturers have scaled back the amount of water their washing machines use. But this has sacrificed rinsing performance – especially in front loaders. Adequate rinsing removes detergent residue which otherwise can leave white marks on dark washing (so you have to re-wash) and can irritate sensitive skin.

You can improve inadequate rinsing performance by adding an extra rinse to the wash cycle or increasing the water level – although this increases the wash's cycle-time and decreases water efficiency. Warmer washes and rinses can also help. As we've found with our [new test method](#), washing smaller loads also improves rinsing.

If you want adequate rinsing, use our [test results](#) to choose a model with a rinsing score of 8 or more.

The solar option

Members with solar hot-water have asked us about using their excess hot water in a washing machine.

Using solar hot water for warm and hot washes should be able to save time (because of shorter wash times) *and* electricity.

Finding a **top loader** to do this is easy, because most top loaders have tap connections for both hot and cold water. You can check whether your top loader's able to use your solar hot water efficiently: run the hot-water tap in your laundry and use a bucket to measure how much cold water flows through before you get hot water.

If you prefer a **front loader**, your options are limited: few front-loading models have dual connections. Even when they do, some draw in hot water only for a hot wash (60°C or hotter). For warm washes, they use their element to heat water.

Video: Washing machine load capacities

Go behind the scenes and find out why we changed the test load for washing machines (1m 52s).

